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LOGINID:ssspta1652dmr

## PASSWORD:

TERMINAL (ENTER 1, 2, 3, OR ?):2

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Welcome to STN International
NEWS
                 Web Page for STN Seminar Schedule - N. America
NEWS
      2
         JAN 02
                 STN pricing information for 2008 now available
NEWS
      3
         JAN 16
                 CAS patent coverage enhanced to include exemplified
                 prophetic substances
NEWS
         JAN 28
                 USPATFULL, USPAT2, and USPATOLD enhanced with new
                 custom IPC display formats
NEWS
      5
         JAN 28
                 MARPAT searching enhanced
NEWS
      6
         JAN 28
                 USGENE now provides USPTO sequence data within 3 days
                 of publication
NEWS
         JAN 28
                 TOXCENTER enhanced with reloaded MEDLINE segment
NEWS
         JAN 28
                 MEDLINE and LMEDLINE reloaded with enhancements
NEWS
     9
         FEB 08
                 STN Express, Version 8.3, now available
NEWS 10
         FEB 20
                 PCI now available as a replacement to DPCI
NEWS 11
         FEB 25
                 IFIREF reloaded with enhancements
NEWS 12
         FEB 25
                 IMSPRODUCT reloaded with enhancements
NEWS 13
         FEB 29
                 WPINDEX/WPIDS/WPIX enhanced with ECLA and current
                 U.S. National Patent Classification
NEWS 14
                 IFICDB, IFIPAT, and IFIUDB enhanced with new custom
        MAR 31
                 IPC display formats
NEWS 15
        MAR 31
                 CAS REGISTRY enhanced with additional experimental
NEWS 16
        MAR 31
                 CA/CAplus and CASREACT patent number format for U.S.
                 applications updated
NEWS 17
         MAR 31
                 LPCI now available as a replacement to LDPCI
NEWS 18
         MAR 31
                 EMBASE, EMBAL, and LEMBASE reloaded with enhancements
NEWS 19
         APR 04
                 STN AnaVist, Version 1, to be discontinued
                 WPIDS, WPINDEX, and WPIX enhanced with new
NEWS 20
         APR 15
                 predefined hit display formats
NEWS 21
         APR 28
                 EMBASE Controlled Term thesaurus enhanced
NEWS 22
        APR 28
                 IMSRESEARCH reloaded with enhancements
NEWS 23
        MAY 30
                 INPAFAMDB now available on STN for patent family
                 searching
NEWS 24
        MAY 30
                 DGENE, PCTGEN, and USGENE enhanced with new homology
                 sequence search option
NEWS 25
         JUN 06
                 EPFULL enhanced with 260,000 English abstracts
NEWS 26
         JUN 06
                 KOREAPAT updated with 41,000 documents
NEWS 27
         JUN 13
                 USPATFULL and USPAT2 updated with 11-character
                 patent numbers for U.S. applications
NEWS 28
         JUN 19
                 CAS REGISTRY includes selected substances from
                 web-based collections
NEWS 29
         JUN 25
                 CA/CAplus and USPAT databases updated with IPC
                 reclassification data
NEWS 30
         JUN 30
                 AEROSPACE enhanced with more than 1 million U.S.
                 patent records
NEWS 31
         JUN 30
                 EMBASE, EMBAL, and LEMBASE updated with additional
                 options to display authors and affiliated
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organizations

NEWS 32 JUN 30 STN on the Web enhanced with new STN AnaVist Assistant and BLAST plug-in

NEWS 33 JUN 30 STN AnaVist enhanced with database content from EPFULL

NEWS EXPRESS JUNE 27 08 CURRENT WINDOWS VERSION IS V8.3, AND CURRENT DISCOVER FILE IS DATED 23 JUNE 2008.

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FILE 'HOME' ENTERED AT 11:42:08 ON 10 JUL 2008

=> index bioscience medicine FILE 'DRUGMONOG' ACCESS NOT AUTHORIZED COST IN U.S. DOLLARS

SINCE FILE TOTAL ENTRY SESSION 0.21 0.21

FULL ESTIMATED COST

INDEX 'ADISCTI, ADISINSIGHT, ADISNEWS, AGRICOLA, ANABSTR, ANTE, AQUALINE, AQUASCI, BIOENG, BIOSIS, BIOTECHABS, BIOTECHOS, BIOTECHNO, CABA, CAPLUS, CEABA-VTB, CIN, CONFSCI, CROPB, CROPU, DDFB, DDFU, DGENE, DISSABS, DRUGB, DRUGMONOG2, DRUGU, EMBAL, EMBASE, ...' ENTERED AT 11:42:28 ON 10 JUL 2008

## 72 FILES IN THE FILE LIST IN STNINDEX

Enter SET DETAIL ON to see search term postings or to view search error messages that display as 0\* with SET DETAIL OFF.

- => s (rnase? (2w) (iii or III or 3))
  - 1 FILE ADISINSIGHT
  - 63 FILE AGRICOLA
  - 5 FILE AQUASCI
  - 48 FILE BIOENG
  - 3627 FILE BIOSIS
    - 55 FILE BIOTECHABS
    - 55 FILE BIOTECHDS
  - 295 FILE BIOTECHNO
  - 76 FILE CABA
  - 1477 FILE CAPLUS
    - 2 FILE CEABA-VTB
    - 1 FILE CIN
    - 16 FILE CONFSCI
      - 2 FILE CROPU
    - 7 FILE DDFU
    - 454 FILE DGENE
    - 72 FILE DISSABS
    - 23 FILE DRUGU
  - 27 FILES SEARCHED...
    - 9 FILE EMBAL

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FILE EMBASE
        543
        394
             FILE ESBIOBASE
         4
             FILE FSTA
        977
             FILE GENBANK
        124
             FILE IFIPAT
        434
             FILE LIFESCI
        736
             FILE MEDLINE
             FILE NTIS
          8
          1
             FILE OCEAN
        170
             FILE PASCAL
  47 FILES SEARCHED...
          1
             FILE PHAR
          1
             FILE PHARMAML
          2
             FILE PHIN
             FILE PROMT
         10
             FILE SCISEARCH
        605
        267
             FILE TOXCENTER
             FILE USGENE
       1207
       1693
             FILE USPATFULL
          2
             FILE USPATOLD
             FILE USPAT2
        138
             FILE WPIDS
         66
             FILE WPIFV
          1
  68 FILES SEARCHED...
         66 FILE WPINDEX
          5
              FILE NLDB
  43 FILES HAVE ONE OR MORE ANSWERS, 72 FILES SEARCHED IN STNINDEX
     QUE (RNASE? (2W) (III OR III OR 3))
L1
=> d rank
F1
          3627 BIOSIS
F2
          1693 USPATFULL
          1477 CAPLUS
F3
F4
         1207 USGENE
F5
          977 GENBANK
F6
          736 MEDLINE
F7
          605 SCISEARCH
F8
          543 EMBASE
F9
         454 DGENE
        434 LIFESCI
394 ESBIOBASE
295 BIOTECHNO
267 TOXCENTER
170 PASCAL
138 USPAT2
F10
F11
F12
F13
F14
F15
          124 IFIPAT
F16
          76 CABA
72 DISSA
F17
                DISSABS
F18
           66
                WPIDS
F19
          66 WPIDS
66 WPINDEX
63 AGRICOLA
55 BIOTECHABS
55 BIOTECHDS
48 BIOENG
23 DRUGU
16 CONFSCI
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                 PROMT
           9
                EMBAL
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            8 NTIS
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F30

7

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F31	5	AQUASCI
F32	5	NLDB
F33	4	FSTA
F34	2	CEABA-VTB
F35	2	CROPU
F36	2	PHIN
F37	2	USPATOLD
F38	1	ADISINSIGHT
F39	1	CIN
F40	1	OCEAN
F41	1	PHAR
F42	1	PHARMAML
F43	1	WPIFV

=> file f1-f4, f6-f8, f10-f15 COST IN U.S. DOLLARS

FULL ESTIMATED COST

SINCE FILE TOTAL ENTRY SESSION 4.55 4.76

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FILE 'USPAT2' ENTERED AT 11:46:23 ON 10 JUL 2008

- CA INDEXING COPYRIGHT (C) 2008 AMERICAN CHEMICAL SOCIETY (ACS)
- $\Rightarrow$  s (rnase? (2w) (iii or III or 3))
  - 11 FILES SEARCHED...
- L2 11586 (RNASE? (2W) (III OR III OR 3))
- => s 12(s) (microb? or prokar? or bacte? or coli? or shewane? or psychro? or (cold?(s)temperatu?)) or (low?(s)temperatu?))
  - 9 FILES SEARCHED...
  - 12 FILES SEARCHED...
- L3 2380 L2(S) (MICROB? OR PROKAR? OR BACTE? OR COLI? OR SHEWANE? OR PSYC HRO? OR (COLD?(S) TEMPERATU?) OR (LOW?(S) TEMPERATU?))
- => d kwic 13 1
- L3 ANSWER 1 OF 2380 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN
- AB. . . RNase III proteins have been grouped in three major classes according to their domain organization. In this issue of Molecular Microbiology, Redko et al. identified a novel class of bacterial RNase III, named Mini-III, consisting only of the RNase III catalytic domain and functioning in the maturation of the 23S rRNA in Bacillus subtilis. Its absence from proteobacteria reveals that. . .
- => s 13(s)(shewan? or (cold(4w)temperatu?) or (low(4w)temperatu?) or psychro?) 12 FILES SEARCHED...
- L4 25 L3(S)(SHEWAN? OR (COLD(4W) TEMPERATU?) OR (LOW(4W) TEMPERATU?)
  OR PSYCHRO?)
- => dup rem 14 DUPLICATE IS NOT AVAILABLE IN 'USGENE'.

ANSWERS FROM THESE FILES WILL BE CONSIDERED UNIQUE

PROCESSING COMPLETED FOR L4

- L5 10 DUP REM L4 (15 DUPLICATES REMOVED)
- => d ti 15 1-10
- L5 ANSWER 1 OF 10 USPATFULL on STN
- TI Polypeptide Having Rnase III Activity
- L5 ANSWER 2 OF 10 CAPLUS COPYRIGHT 2008 ACS on STN
- TI Shewanella protein with temperature sensitive RNase III activity for dsRNA cleavage useful in producing siRNA that mediate RNA interference
- L5 ANSWER 3 OF 10 USPATFULL on STN
- TI Compositions and methods for the therapy and diagnosis of colon cancer
- L5 ANSWER 4 OF 10 USPATFULL on STN
- ${
  m TI}$  Compositions and methods for the therapy and diagnosis of pancreatic cancer
- L5 ANSWER 5 OF 10 USPATFULL on STN
- TI Compositions and methods for the therapy and diagnosis of colon cancer
- L5 ANSWER 6 OF 10 USPATFULL on STN
- TI Compositions and methods for the therapy and diagnosis of ovarian cancer
- L5 ANSWER 7 OF 10 LIFESCI COPYRIGHT 2008 CSA on STN DUPLICATE 1
- TI Increased Expression of Escherichia coli Polynucleotide Phosphorylase at

Low Temperatures Is Linked to a Decrease in the Efficiency of Autocontrol

- L5 ANSWER 8 OF 10 LIFESCI COPYRIGHT 2008 CSA on STN DUPLICATE 2
- TI Cold-temperature induction of Escherichia coli polynucleotide phosphorylase occurs by reversal of its autoregulation
- L5 ANSWER 9 OF 10 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN DUPLICATE 3
- TI The cryoprotective role of polyols in lichens: Effects on the redistribution of RNase in Evernia prunastri thallus during freezing.
- L5 ANSWER 10 OF 10 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN DUPLICATE 4
- TI Lethal double-stranded RNA processing activity of ribonuclease III in the absence of SuhB protein of Escherichia coli.

#### => d ibib abs 15 1-10

L5 ANSWER 1 OF 10 USPATFULL on STN

ACCESSION NUMBER: 2007:249888 USPATFULL

TITLE: Polypeptide Having Rnase III Activity

INVENTOR(S): Tomono, Jun, Okayama, JAPAN
Ueno, Harumi, Shiga, JAPAN

Ueno, Harumi, Shiga, JAPAN Sagawa, Hiroaki, Shiga, JAPAN Kato, Ikunoshin, Shiga, JAPAN

	NUMBER	KIND	DATE	
PATENT INFORMATION:	US 20070218524	A1	20070920	
APPLICATION INFO.:	US 20070210324		20070320	(10)
ATTECATION INTO	WO 2004-JP14255	MI	20040929	(10)
			20060324	PCT 371 date

		NUMBER	DATE
PRIORITY	INFORMATION:	JP 2003-34226	20030930
		JP 2003-40963	8 20031208

JP 2003-409638
DOCUMENT TYPE: Utility
FILE SEGMENT: APPLICATION

LEGAL REPRESENTATIVE: BROWDY AND NEIMARK, P.L.L.C., 624 NINTH STREET, NW,

SUITE 300, WASHINGTON, DC, 20001-5303, US

NUMBER OF CLAIMS: 17
EXEMPLARY CLAIM: 1
LINE COUNT: 1564

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB A polypeptide having an RNase III activity with which the length of a dsRNA degradation product can be easily controlled depending on reaction conditions and, in preparing a dsRNA having a length allowing it to serve as an siRNA in RNA interference, a low-molecular weight product having little RNA interferring effect is scarcely formed; a method of degrading a dsRNA with the use of the above polypeptide; and a composition and a kit for the above method.

# CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L5 ANSWER 2 OF 10 CAPLUS COPYRIGHT 2008 ACS on STN

ACCESSION NUMBER: 2005:300586 CAPLUS

DOCUMENT NUMBER: 142:351175

TITLE: Shewanella protein with temperature

sensitive RNase III activity for

 $\operatorname{dsRNA}$  cleavage useful in producing siRNA that mediate

RNA interference

INVENTOR(S): Tomono, Jun; Ueno, Harumi; Sagawa, Hiroaki; Kato,

Ikunoshin

PATENT ASSIGNEE(S): Takara Bio Inc., Japan SOURCE: PCT Int. Appl., 43 pp.

CODEN: PIXXD2

DOCUMENT TYPE: Patent LANGUAGE: Japanese

FAMILY ACC. NUM. COUNT: 1

PATENT INFORMATION:

PA	TENT :	NO.			KIN	D	DATE			APPL	ICAT	ION 1	NO.		D.	ATE	
WO	2005	0309	48		A1		2005	0407	1	WO 2	004-	JP14:	255		2	0040	929
	W:	ΑE,	AG,	ΑL,	ΑM,	ΑT,	ΑU,	ΑZ,	BA,	BB,	ΒG,	BR,	BW,	BY,	ΒZ,	CA,	CH,
		CN,	CO,	CR,	CU,	CZ,	DE,	DK,	DM,	DZ,	EC,	EE,	EG,	ES,	FΙ,	GB,	GD,
		GE,	GH,	GM,	HR,	HU,	ID,	IL,	IN,	IS,	JP,	ΚE,	KG,	KP,	KR,	KΖ,	LC,
		LK,	LR,	LS,	LT,	LU,	LV,	MA,	MD,	MG,	MK,	MN,	MW,	MX,	MΖ,	NΑ,	NΙ,
		NO,	NZ,	OM,	PG,	PH,	PL,	PT,	RO,	RU,	SC,	SD,	SE,	SG,	SK,	SL,	SY,
		ТJ,	TM,	TN,	TR,	TT,	TZ,	UA,	UG,	US,	UZ,	VC,	VN,	YU,	ZA,	ZM,	ZW
	RW:	BW,	GH,	GM,	ΚE,	LS,	MW,	MΖ,	NA,	SD,	SL,	SZ,	TZ,	UG,	ZM,	ZW,	ΑM,
		AZ,	BY,	KG,	KΖ,	MD,	RU,	ТJ,	TM,	ΑT,	BE,	BG,	CH,	CY,	CZ,	DE,	DK,
		EE,	ES,	FI,	FR,	GB,	GR,	HU,	IE,	ΙT,	LU,	MC,	NL,	PL,	PT,	RO,	SE,
		SI,	SK,	TR,	BF,	ΒJ,	CF,	CG,	CI,	CM,	GA,	GN,	GQ,	GW,	ML,	MR,	NE,
		SN,	TD,	TG													
EP	1672	060			A1		2006	0621	EP 2004-788321			21	20040929			929	
	R:	ΑT,	BE,	CH,	DE,	DK,	ES,	FR,	GB,	GR,	IT,	LI,	LU,	NL,	SE,	MC,	PT,
		ΙE,	SI,	FI,	RO,	CY,	TR,	BG,	CZ,	EE,	ΗU,	PL,	SK				
CN	1860	225			Α		2006	1108	(	CN 2	004-	8002	8423		2	0040	929
US	2007	0218	524		A1		2007	0920	1	US 2	006-	5733	81		2	0060	324
PRIORIT	Y APP	LN.	INFO	. :						JP 2	003-	3422	60	Ĩ	A 2	0030	930
										JP 2	003-	4096	38	Ĩ	A 2	0031	208
									1	WO 2	004-	JP14:	255	Ţ	N 2	0040	929

The present invention concerns methods and compns. involving protein AΒ containing RNase III activity to generate RNA capable of triggering RNA-mediated interference (RNAi) in a cell. A protein having an RNase III activity with which the length of a dsRNA degradation product can be easily controlled depending on reaction conditions and, a method of degrading a dsRNA with the use of the above protein; and a composition and a kit for the above method; are provided. The present invention further concerns methods using polypeptides with RNase III activity for generating RNA mols. that effect RNAi. Also claimed are fusion of this protein with nucleic acid-binding protein. A protein having an RNase III activity was cloned from Shewanella sp. Ac10. Compared to Escherichia coli RNase III, the Shewanella RNase III was much more temperature sensitive and the length of a dsRNA degradation product can be more easily controlled. Addition of Thermotoga maritima cold shock protein CspB as fusion facilitated the dsRNA degrading activity of the protein. Short dsRNA degradation products having little RNA interfering effect was scarcely produced in preparing a dsRNA; thus allowing it to serve as siRNA in RNA interference.

REFERENCE COUNT:

6 THERE ARE 6 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT

L5 ANSWER 3 OF 10 USPATFULL on STN

ACCESSION NUMBER: 2003:237907 USPATFULL

TITLE: Compositions and methods for the therapy and diagnosis

of colon cancer

INVENTOR(S): King, Gordon E., Shoreline, WA, UNITED STATES

Meagher, Madeleine Joy, Seattle, WA, UNITED STATES

Xu, Jiangchun, Bellevue, WA, UNITED STATES

Secrist, Heather, Seattle, WA, UNITED STATES

Jiang, Yuqiu, Kent, WA, UNITED STATES

PATENT ASSIGNEE(S): Corixa Corporation, Seattle, WA, UNITED STATES, 98104

(U.S. corporation)

	N	JMBER	KIND	DATE		
PATENT INFORMATION:	US 200	30166064	A1	20030904		
A DDI TOAMTON THEO	TTO OOO	2 00000	73.11	00000014		

APPLICATION INFO.: US 2002-99926 A1 20020314 (10)

RELATED APPLN. INFO.: Continuation-in-part of Ser. No. US 2001-33528, filed on 26 Dec 2001, PENDING Continuation-in-part of Ser. No. US 2001-920300, filed on 31 Jul 2001, PENDING

DOCUMENT TYPE: Utility FILE SEGMENT: APPLICATION

LEGAL REPRESENTATIVE: SEED INTELLECTUAL PROPERTY LAW GROUP PLLC, 701 FIFTH

AVE, SUITE 6300, SEATTLE, WA, 98104-7092

NUMBER OF CLAIMS: 17
EXEMPLARY CLAIM: 1
LINE COUNT: 8531

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB Compositions and methods for the therapy and diagnosis of cancer, particularly colon cancer, are disclosed. Illustrative compositions comprise one or more colon tumor polypeptides, immunogenic portions thereof, polynucleotides that encode such polypeptides, antigen presenting cell that expresses such polypeptides, and T cells that are specific for cells expressing such polypeptides. The disclosed compositions are useful, for example, in the diagnosis, prevention and/or treatment of diseases, particularly colon cancer.

# CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L5 ANSWER 4 OF 10 USPATFULL on STN

ACCESSION NUMBER: 2003:106233 USPATFULL

TITLE: Compositions and methods for the therapy and diagnosis

of pancreatic cancer

INVENTOR(S): Benson, Darin R., Seattle, WA, UNITED STATES

Kalos, Michael D., Seattle, WA, UNITED STATES Lodes, Michael J., Seattle, WA, UNITED STATES Persing, David H., Redmond, WA, UNITED STATES Hepler, William T., Seattle, WA, UNITED STATES

20010820 (60)

Jiang, Yuqiu, Kent, WA, UNITED STATES

PATENT ASSIGNEE(S): Corixa Corporation, Seattle, WA, UNITED STATES, 98104

(U.S. corporation)

		NUMBER	KIND	DATE	
PATENT INFORMATION: APPLICATION INFO.:		20030073144 2002-60036	A1 A1	20030417 20020130	(10)
		NUMBER	DA	TE 	
PRIORITY INFORMATION:	US US	2001-333626P 2001-305484P 2001-265305P 2001-267568P		, ,	

US 2001-313999P

US 2001-291631P 20010516 (60) US 2001-287112P 20010428 (60) US 2001-278651P 20010321 (60) US 2001-265682P 20010131 (60)

DOCUMENT TYPE: Utility FILE SEGMENT: APPLICATION

LEGAL REPRESENTATIVE: SEED INTELLECTUAL PROPERTY LAW GROUP PLLC, 701 FIFTH

AVE, SUITE 6300, SEATTLE, WA, 98104-7092

NUMBER OF CLAIMS: 17
EXEMPLARY CLAIM: 1
LINE COUNT: 14253

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB Compositions and methods for the therapy and diagnosis of cancer, particularly pancreatic cancer, are disclosed. Illustrative compositions comprise one or more pancreatic tumor polypeptides, immunogenic portions thereof, polynucleotides that encode such polypeptides, antigen presenting cell that expresses such polypeptides, and T cells that are specific for cells expressing such polypeptides. The disclosed compositions are useful, for example, in the diagnosis, prevention and/or treatment of diseases, particularly pancreatic cancer.

## CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L5 ANSWER 5 OF 10 USPATFULL on STN

ACCESSION NUMBER: 2002:272801 USPATFULL

TITLE: Compositions and methods for the therapy and diagnosis

of colon cancer

INVENTOR(S): Stolk, John A., Bothell, WA, UNITED STATES

 ${\tt Xu}, \; {\tt Jiangchun}, \; {\tt Bellevue}, \; {\tt WA}, \; {\tt UNITED} \; {\tt STATES}$  Chenault, Ruth A., Seattle, WA, UNITED STATES

Meagher, Madeleine Joy, Seattle, WA, UNITED STATES

PATENT ASSIGNEE(S): Corixa Corporation, Seattle, WA, UNITED STATES, 98104

(U.S. corporation)

DOCUMENT TYPE: Utility FILE SEGMENT: APPLICATION

LEGAL REPRESENTATIVE: SEED INTELLECTUAL PROPERTY LAW GROUP PLLC, 701 FIFTH

AVE, SUITE 6300, SEATTLE, WA, 98104-7092

NUMBER OF CLAIMS: 17
EXEMPLARY CLAIM: 1
LINE COUNT: 9233

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB Compositions and methods for the therapy and diagnosis of cancer, particularly colon cancer, are disclosed. Illustrative compositions comprise one or more colon tumor polypeptides, immunogenic portions thereof, polynucleotides that encode such polypeptides, antigen presenting cell that expresses such polypeptides, and T cells that are specific for cells expressing such polypeptides. The disclosed compositions are useful, for example, in the diagnosis, prevention and/or treatment of diseases, particularly colon cancer.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L5 ANSWER 6 OF 10 USPATFULL on STN

ACCESSION NUMBER: 2002:243051 USPATFULL

TITLE: Compositions and methods for the therapy and diagnosis

of ovarian cancer

INVENTOR(S): Algate, Paul A., Issaquah, WA, UNITED STATES

Jones, Robert, Seattle, WA, UNITED STATES

Harlocker, Susan L., Seattle, WA, UNITED STATES

PATENT ASSIGNEE(S): Corixa Corporation, Seattle, WA, UNITED STATES, 98104

(U.S. corporation)

NUMBER DATE

PRIORITY INFORMATION: US 2000-207484P 20000526 (60)

DOCUMENT TYPE: Utility FILE SEGMENT: APPLICATION

LEGAL REPRESENTATIVE: SEED INTELLECTUAL PROPERTY LAW GROUP PLLC, 701 FIFTH

AVE, SUITE 6300, SEATTLE, WA, 98104-7092

NUMBER OF CLAIMS: 11
EXEMPLARY CLAIM: 1
LINE COUNT: 25718

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

AB Compositions and methods for the therapy and diagnosis of cancer, particularly ovarian cancer, are disclosed. Illustrative compositions comprise one or more ovarian tumor polypeptides, immunogenic portions thereof, polynucleotides that encode such polypeptides, antigen presenting cell that expresses such polypeptides, and T cells that are specific for cells expressing such polypeptides. The disclosed compositions are useful, for example, in the diagnosis, prevention and/or treatment of diseases, particularly ovarian cancer.

CAS INDEXING IS AVAILABLE FOR THIS PATENT.

L5 ANSWER 7 OF 10 LIFESCI COPYRIGHT 2008 CSA on STN DUPLICATE 1

ACCESSION NUMBER: 2001:84460 LIFESCI

TITLE: Increased Expression of Escherichia coli Polynucleotide

Phosphorylase at Low Temperatures Is Linked to a Decrease

in the Efficiency of Autocontrol

AUTHOR: Mathy, N.; Jarrige, A.Q.; Robert-Le Meur, M.; Portier, C.\*

CORPORATE SOURCE: UPR9073 du CNRS, Institut de Biologie PhysicoChimique, 13

rue Pierre et Marie Curie, 75005 Paris, France; E-mail:

portier@ibpc.fr

SOURCE: Journal of Bacteriology [J. Bacteriol.], (20010700) vol.

183, no. 13, pp. 3848-3854.

ISSN: 0021-9193.

DOCUMENT TYPE: Journal FILE SEGMENT: N; J LANGUAGE: English SUMMARY LANGUAGE: English

AB Polynucleotide phosphorylase (PNPase) synthesis is translationally autocontrolled via an RNase III-dependent mechanism, which results in a tight correlation between protein level and messenger stability. In cells grown at 18 degree C, the amount of PNPase is twice that found in cells grown at 30 degree C. To investigate whether this effect was transcriptional or posttranscriptional, the expression of a set

of pnp-lacZ transcriptional and translational fusions was analyzed in

cells grown at different temperatures. In the absence of PNPase, there was no increase in pnp-lacZ expression, indicating that the increase in pnp expression occurs at a posttranscriptional level. Other experiments clearly show that increased pnp expression at low temperature is only observed under conditions in which the autocontrol mechanism of PNPase is functional. At low temperature, the destabilizing effect of PNPase on its own mRNA is less efficient, leading to a decrease in repression and an increase in the expression level.

COPYRIGHT 2008 CSA on STN DUPLICATE 2 ANSWER 8 OF 10 LIFESCI

ACCESSION NUMBER: 2001:47231 LIFESCI

TITLE: Cold-temperature induction of Escherichia coli

polynucleotide phosphorylase occurs by reversal of its

autoregulation

Beran, K.R.; Simons, W.R. AUTHOR:

CORPORATE SOURCE: 1602 Molecular Science, Department of Microbiology,

Immunology and Molecular Genetics, University of

California, Los Angeles, CA 90095, USA.

SOURCE: Molecular Microbiology [Mol. Microbiol.], (20010100) vol.

39, no. 1, pp. 112-125.

ISSN: 0950-382X.

DOCUMENT TYPE: Journal FILE SEGMENT: N; J LANGUAGE: English SUMMARY LANGUAGE: English

When Escherichia coli cells are shifted to low

temperatures (e.g. 15 degree C), growth halts while the '

cold shock response' (CSR) genes are induced, after which growth

resumes. One CSR gene, pnp, encodes polynucleotide phosphorylase (PNPase), a 3'-exoribonuclease and component of the RNA degradosome. At 37 degree C,

ribonuclease III (RNase III, encoded by rnc) cleaves

the pnp untranslated leader, whereupon PNPase represses its own translation by an unknown mechanism. Here, we show that PNPase

cold-temperature induction involves several

post-transcriptional events, all of which require the intact pnp mRNA leader. The bulk of induction results from reversal of autoregulation at a

step subsequent to RNase III cleavage of the pnp

leader. We also found that pnp translation occurs throughout cold

-temperature adaptation, whereas lacZ super(+) translation was

delayed. This difference is striking, as both mRNAs are greatly stabilized upon the shift to 15 degree C. However, unlike the lacZ super(+) mRNA,

which remains stable during adaptation, pnp mRNA decay accelerates. Together with other evidence, these results suggest that mRNA is generally stabilized upon a shift to cold temperatures, but that

a CSR mRNA-specific decay process is initiated during adaptation.

ANSWER 9 OF 10 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN L5

DUPLICATE 3

2000:503443 BIOSIS ACCESSION NUMBER: PREV200000503443 DOCUMENT NUMBER:

The cryoprotective role of polyols in lichens: Effects on TITLE:

the redistribution of RNase in Evernia prunastri thallus

during freezing.

AUTHOR (S): Fontaniella, Blanca; Vicente, Carlos [Reprint author];

Legaz, Maria-Estrella

CORPORATE SOURCE: Department of Plant Physiology, Lichen Team, Faculty of

Biology, Complutense University, 28040, Madrid, Spain Plant Physiology and Biochemistry (Paris), (July-August,

SOURCE:

2000) Vol. 38, No. 7-8, pp. 621-627. print. CODEN: PPBIEX. ISSN: 0981-9428.

DOCUMENT TYPE: Article LANGUAGE: English

ENTRY DATE: Entered STN: 22 Nov 2000

Last Updated on STN: 11 Jan 2002

The effect of low temperatures on the distribution of AB RNase (EC 3.1.26.1) in the lichen Evernia prunastri (L.) Ach. has been studied in laboratory conditions. Freezing of lichen thalli produces solubilization of part of the particulate enzyme from the cell wall of both mycobiont and phycobiont to the corresponding cytoplasm. A supply of exogenous ribitol (naturally produced by the algal partner) totally prevents the solubilization of the enzyme whereas mannitol (naturally produced by the fungal partner) impedes the enzyme solubilization to a minor extent. RNase is preferably located in the phycobiont cells in terms of specific activity. Ribitol also impedes the solubilization of algal enzyme whereas mannitol strongly promotes the loss of RNase from algal cell wall to the soluble fraction. Solubilization of fungal enzyme is enhanced by both polyols, with a preference for ribitol.

L5ANSWER 10 OF 10 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN DUPLICATE 4

ACCESSION NUMBER: 1995:401958 BIOSIS DOCUMENT NUMBER: PREV199598416258

TITLE: Lethal double-stranded RNA processing activity of

ribonuclease III in the absence of SuhB protein of

Escherichia coli.

AUTHOR(S):

Inada, T.; Nakamura, Y. [Reprint author]
Dep. Tumor Biol., Inst. Med. Sci., University Tokyo, 4-6-1 CORPORATE SOURCE:

Shirokanedai, Minato-ku, Tokyo 108, Japan Biochimie (Paris), (1995) Vol. 77, No. 4, pp. 294-302. SOURCE:

CODEN: BICMBE. ISSN: 0300-9084.

DOCUMENT TYPE: Article LANGUAGE: English

ENTRY DATE: Entered STN: 13 Sep 1995

Last Updated on STN: 10 Oct 1995

The suhB gene of Escherichia coli has been defined by its mutant allele AΒ that suppresses other mutants in secY, rpoH, dnaB, and era. The suhB mutant by itself is cold sensitive, and is shown to have defects in protein synthesis. Starting with the suhB cold-sensitive mutant, cold-resistant suppressors were isolated. These suppressors mapped to the gene rnc encoding RNase III (a double-strand RNA-processing enzyme), and restored normal protein synthesis to the suhB mutants. Two known rnc mutations, rnc70 or rnc105, both defective in RNA cleavage activity, similarly restored growth of suhB. These rnc mutations did not alter the level of suhB expression. These results suggest that wild-type RNase III exerts a lethal effect on E. coli upon depletion of SuhB at low temperatures. One explanation is to assume that the double-strand RNA-processing activity of RNase III itself is potentially lethal to E. coli and the normal function of SuhB modulates the lethal action of RNase III.

## => d kwic 15 1-10

ANSWER 1 OF 10 USPATFULL on STN

For easy control of reaction conditions, the present inventors have SUMM intensively examined a polypeptide having an RNase III activity that can be heat-inactivated at a temperature lower than an RNase III derived from a mesophile, and with which mild degradation conditions can be set utilizing the thermosensitivity. As a result, the present inventors have found that a polypeptide having an RNase III activity derived from a cold-adapted microorganism has an RNase III activity with which a length of a dsRNA

degradation product can be readily controlled by reaction conditions, and which does not tend to produce a small molecule whose RNA interference effect is low upon preparation of an siRNA of a length that is capable of functioning in RNA interference as an siRNA. The present inventors have attempted to clone a polynucleotide encoding a polypeptide having an RNase III activity from a cold-adapted microorganism Shewanella sp. Ac10 which can grow at 4° C., successfully expressed the polypeptide having an RNase III activity of interest, and found that the activity of the RNase III is preferable for preparation of an siRNA. Thus, the present invention has been completed. There is no specific limitation concerning a vector used for producing the polypeptide having an RNase III activity of the present invention. Any commercially available vector or expression system may be used. In particular, the pET system. . . intended to limit the present invention. In addition, a vector having a promoter that is capable of functioning at a low temperature can be preferably used. Examples thereof include the pCold-series vectors as described in WO 99/27117. . . . of the respective ORFs to enzymes was obtained by the BLAST. searches. A gene of interest from the cold-adapted microorganism Shewanella sp. Ac10 that was presumed to encode an RNase III and has the nucleotide sequence of SEQ ID NO:1 was obtained from them. Thus, it was shown that the polypeptide having an RNase III activity from the cold-adapted microorganism is more temperature-sensitive and can be inactivated at a lower temperature than the RNase III from Escherichia coli. . . in Table 1. TABLE 1 Average

DETD

DETD

DETD

DETD

fluorescence intensity

Transferred sample

Control (no addition) 8.09 Control (vector alone) 1331.44 E. coli RNase III (complete degradation)

1035.36

E. coli RNase III (partial degradation) 637.30

Shewanella sp. Ac10 RNase III 295.14

DETD . . (vector alone) as shown in Table 1 represents more RNA interference. It was confirmed that the degradation product with the RNase III from Shewanella sp. Ac10 exhibited an RNA interference effect stronger than the complete or partial degradation product with the RNase III from Escherichia coli.

DETD The RNA interference effect of a dsRNA degradation product prepared using the RNase III from the cold-adapted microorganism of the present invention was examined. A commercially available E. coli RNase III (Epicentre) was used as a control. A dsRNA degradation product was prepared basically according to the method as described in. . .  $\mu g$  of rsGFP-dsRNA prepared in Example 4-(1) was cleaved at 30° C. for one hour using 2  $\mu$ l of the RNase III from Shewanella as described in Example 3-(2). In case of the commercially available E. coli RNase III

```
(1 U/\mu l), 10 \mu g of the dsRNA was cleaved at 37° C. for 10
       minutes (partial degradation) or 60 minutes (complete degradation) using
       2 μl of the RNase III. The cleavage products were
       purified using RNA Purification Column 1, 2 (Gene Therapy Systems) and
       used for assessments in RNA.
DETD
        . . . Table 2.
TABLE 2
                                              Average
                                               fluorescence
                                               intensity
    Transferred sample
                                               (relative value)
    Control (no addition)
    Control (vector alone)
                                              100
      Shewanella sp. AC10 RNase III
       49.19
    Commercially available E. coli RNase III
       77.62
    (partial degradation)
    Commercially available E. coli RNase III
       93.81
    (complete degradation)
DETD
        . . . as shown in Table 2 represents more RNA interference. It was
       confirmed that the dsRNA degradation product obtained using the
       RNase III from Shewanella sp. AC10 exhibited
       an RNAi effect like the one obtained using the commercially available E.
       coli RNase III, and the exhibited RNA
       interference effect was stronger than that of the one obtained using the
       commercially available E. coli RNase III.
DETD
       . . . 3.
TABLE 3
                                              Amount of
                                              rsGFP mRNA
    Transferred sample
                                               (relative value)
    Control (no addition)
    Control (vector alone)
                                              100
      Shewanella sp. AC10 RNase III
    Commercially available E. coli RNase III
    (partial degradation)
    Commercially available E. coli RNase III
       72.30
    (complete degradation)
DETD
       . . . as shown in Table 3 represents more RNA interference. It was
       confirmed that the dsRNA degradation product obtained using the
       RNase III from Shewanella sp. AC10 exhibited
       an effect like the one obtained using the commercially available E.
       coli RNase III, and the exhibited RNA
       interference effect was stronger than that of the one obtained using the
       commercially available E. coli RNase III.
DETD
       . . . 4-(1). Specifically, 10 \mu g of the dsRNA was cleaved at
       30° C. for one hour using 2 \mu l of the Shewanella
       RNase III in Example 3-(\bar{2}), or at 37° C. for 10
       minutes (partial degradation) or 60 minutes (complete degradation) using
```

```
2 µl of the commercially available E. coli RNase
       III (1 \text{U}/\mu\text{l}) The cleavage products were purified using RNA
       Purification Column 1, 2 (Gene Therapy Systems) and used for assessments
       in RNA interference as follows. The product of cleavage at 37^{\circ} C.
       for 10 minutes with the E. coli RNase III
       was subjected to polyacrylamide gel electrophoresis, and a band
       corresponding to a length of about 21 bp was excised. TE.
DETD
TABLE 4
                                               GL3
                                               expression level
    Transferred siRNA sample
                                               (relative value)
    Control (no addition)
                                               0
    Control (vector alone)
                                               100
      Shewanella sp. AC10 RNase III 500 ng
       10.71
      Shewanella sp. AC10 RNase III 166.7 ng
      Shewanella sp. AC10 RNase III 55.6 ng
       19.06
    Commercially available E. coli RNase III
       10.13
    (partial degradation) 500 ng
    Commercially available E. coli RNase III
       13.43
    (partial degradation) 166.7 ng
    Commercially available E. coli RNase III
       29.83
    (partial degradation) 55.6 ng
    Commercially available E. coli RNase III
    (complete degradation) 500 ng
    Commercially available E. coli RNase III
    (complete degradation) 166.7 ng
    Commercially available E. coli RNase III
    (complete degradation) 55.6 ng
    Commercially available E. coli RNase III
    (gel-recovery) 500 ng
    Commercially available E. coli RNase III
    (gel-recovery) 166.7 ng
    Commercially available E. coli RNase III
       39.69
    (gel-recovery) 55.6 ng
DETD
        . . . as shown in Table 4 represents more RNA interference. It was
       confirmed that the dsRNA degradation product obtained using the
       Shewanella RNase III exhibited an RNA
       interference effect like the one obtained using the commercially
       available E. coil RNase III, and the exhibited RNA
       interference effect was stronger than that of the one obtained using the
       commercially available E. coli RNase III.
       It was further shown that the effect was superior to that of the
       gel-recovered cleavage product.
DETD
       Comparison between Shewanella RNase III
       and Dicer from Human
```

```
DETD
        The RNA interference effect of a dsRNA prepared using the
       Shewanella RNase III was compared with the
       RNA interference effect of a dsRNA prepared using a Dicer from human.
       The assessment system using. . .
DETD
        . . . 5.
TABLE 5
                                              GL3 mRNA amount
    Transferred siRNA sample
                                              (relative value)
    Control (no addition)
    Control (vector alone)
                                              100
      Shewanella RNase III 500 ng
      Shewanella RNase III 166.7 ng
       10.50
      Shewanella RNase III 55.6 ng
       21.22
      Shewanella RNase III 18.5 ng
       42.33
    Commercially available Dicer from human
                                              8.21
    166.7 ng
    Commercially available Dicer from human
                                              9.73
    55.6 ng
    Commercially.
DETD
       . . (vector alone) as shown in Table 5 represents more RNA
       interference. It was confirmed that the siRNA obtained using the
       Shewanella RNase III exhibited an RNA
       interference effect equivalent to the one obtained using the
       commercially available Dicer.
       SEQUENCE CHARACTERISTICS:
DETD
SEQ ID NO: 3
LENGTH: 37
TYPE: DNA
ORGANISM: Artificial
FEATURE:
OTHER INFORMATION: Synthetic primer 2 to amplify a gene encoding
       Shewanella sp.AC10 RNaseIII
ggagaggtct ggatccttat ttattcagta gctcctt
                                                                      37
L_{5}
     ANSWER 2 OF 10 CAPLUS COPYRIGHT 2008 ACS on STN
ТΤ
     Shewanella protein with temperature sensitive RNase
     III activity for dsRNA cleavage useful in producing siRNA that
     mediate RNA interference
     . . . RNA mols. that effect RNAi. Also claimed are fusion of this
AB
     protein with nucleic acid-binding protein. A protein having an
     RNase III activity was cloned from Shewanella
     sp. Ac10. Compared to Escherichia coli RNase
     III, the Shewanella RNase III was
     much more temperature sensitive and the length of a dsRNA degradation product
can be
     more easily controlled. Addition of. .
     Shewanella protein temp sensitive RNase III
     dsRNA cleavage; siRNA RNA interference Shewanella RNase
     III
IT
     Proteins
     RL: BUU (Biological use, unclassified); BIOL (Biological study); USES
        (CspB (cold-shock protein B), fusion protein with; Shewanella
```

```
protein with temperature sensitive RNase III activity for
        dsRNA cleavage useful in producing siRNA that mediate RNA interference)
     DNA sequences
ΤТ
     Protein sequences
       Shewanella
     Temperature effects, biological
        (Shewanella protein with temperature sensitive RNase
        III activity for dsRNA cleavage useful in producing siRNA that
        mediate RNA interference)
IT
     Double stranded RNA
     RL: BSU (Biological study, unclassified); BIOL (Biological study)
        (Shewanella protein with temperature sensitive RNase
        III activity for dsRNA cleavage useful in producing siRNA that
        mediate RNA interference)
IT
     Fusion proteins (chimeric proteins)
     RL: BUU (Biological use, unclassified); BIOL (Biological study); USES
     (Uses)
        (Shewanella protein with temperature sensitive RNase
        III activity for dsRNA cleavage useful in producing siRNA that
        mediate RNA interference)
ΤТ
     Thermotoga maritima
        (cold shock protein CspB, fusion protein with; Shewanella
        protein with temperature sensitive RNase III activity for
        dsRNA cleavage useful in producing siRNA that mediate RNA interference)
     Proteins
IT
     RL: BUU (Biological use, unclassified); BIOL (Biological study); USES
     (Uses)
        (cold-shock, fusion protein with; Shewanella protein with
        temperature sensitive RNase III activity for dsRNA
        cleavage useful in producing siRNA that mediate RNA interference)
     Post-transcriptional processing
TΤ
        (interference; Shewanella protein with temperature sensitive
        RNase III activity for dsRNA cleavage useful in
        producing siRNA that mediate RNA interference)
IT
     Proteins
     RL: BUU (Biological use, unclassified); BIOL (Biological study); USES
     (Uses)
        (nucleic acid-binding, fusion protein with; Shewanella
        protein with temperature sensitive RNase III activity for
        dsRNA cleavage useful in producing siRNA that mediate RNA interference)
     Double stranded RNA
IT
     RL: BPN (Biosynthetic preparation); BIOL (Biological study); PREP
     (Preparation)
        (small interfering; Shewanella protein with temperature sensitive
        RNase III activity for dsRNA cleavage useful in
        producing siRNA that mediate RNA interference)
     9073-62-5P, E.C. 3.1.26.3
TΤ
     RL: BPN (Biosynthetic preparation); BSU (Biological study, unclassified);
     CAT (Catalyst use); BIOL (Biological study); PREP (Preparation); USES
     (Uses)
        (E.C. 3.1.26.3; Shewanella protein with temperature sensitive
        RNase III activity for dsRNA cleavage useful in
        producing siRNA that mediate RNA interference)
ΙT
     848885-26-7, RNase III (Shewanella sp.
     strain Ac10)
     RL: BSU (Biological study, unclassified); PRP (Properties); BIOL
     (Biological study)
        (amino acid sequence; Shewanella protein with temperature sensitive
        RNase III activity for dsRNA cleavage useful in
        producing siRNA that mediate RNA interference)
ΤТ
     848885-25-6
     RL: BSU (Biological study, unclassified); PRP (Properties); BIOL
```

(Biological study)

(nucleotide sequence; Shewanella protein with temperature sensitive RNase III activity for dsRNA cleavage useful in producing siRNA that mediate RNA interference)

ΙT 848887-02-5 848887-03-6 848887-05-8

848887-06-9 848887-07-0 848887-12-7 848887-13-8 848887-08-1 848887-09-2 848887-10-5

848887-14-9 848887-15-0 848887-16-1

RL: PRP (Properties)

(unclaimed nucleotide sequence; shewanella protein with temperature sensitive RNase III activity for dsRNA cleavage

useful in producing siRNA that mediate RNA interference)

848887-04-7 848887-11-6 IT

RL: PRP (Properties)

(unclaimed protein sequence; shewanella protein with temperature sensitive RNase III activity for dsRNA cleavage useful in producing siRNA that mediate RNA interference)

#### L5ANSWER 3 OF 10 USPATFULL on STN

SUMM [2042] For example, certain amino acids may be substituted for other amino acids in a protein structure without appreciable loss of interactive binding capacity with structures such as, for example, antigenbinding regions of antibodies or binding sites on substrate molecules. Since it is the interactive capacity and nature of a protein that defines that protein's biological functional activity, certain amino acid sequence substitutions can be made in a protein sequence, and, of course, its underlying DNA coding sequence, and nevertheless obtain a protein with like properties. It is thus contemplated that various changes may be made in the peptide sequences of the disclosed compositions, or corresponding DNA sequences which encode said peptides without appreciable loss of their biological utility or activity.

TABLE 1

Amino Acids Codons

Alanine GCU	Ala	A	GCA GCC GCG
Cysteine	Cys	С	UGC UGU
Aspartic acid	Asp	D	GAC GAU
Glutamic acid	Glu	E	GAA GAG
Phenylalanine	Phe	F	UUC UUU
Glycine	Gly	G	GGA GGC GGG GGU
Histidine	His	Н	CAC CAU
Isoleucine	Ile	I	AUA AUC AUU
Lysine	Lys	K	AAA AAG
Leucine	Leu	L	UUA UUG CUA CUC CUG CUU

Methionine	Met	М	AUG
Asparagine	Asn	N	AAC AAU
Proilne	Pro	P	CCA CCC CCG CCU
Glutamine	Gln	Q	CAA CAG
Arginine	Arg	R	AGA AGG CGA CGC CGG CGU
Serine	Ser	S	AGC AGU UCA UCC UCG UCU
Threonine	Thr	T	ACA ACC ACG ACU
Valine	Val	V	GUA GUC GUG GUU
Tryptophan	Trp	M	UGG
Tyrosine	Tyr	Y	UAC UAU

- L5 ANSWER 4 OF 10 USPATFULL on STN
  SUMM [2043] SEQ ID NO:2003 is the determined cDNA sequence of clone
  61496359
- L5 ANSWER 5 OF 10 USPATFULL on STN
  SUMM [2044] SEQ ID NO:1997 is the determined cDNA sequence for clone 62227174 R0394:B12
- L5 ANSWER 6 OF 10 USPATFULL on STN SUMM [2043] SEQ ID NO: 2004 represents the cDNA sequence for clone AA165409.
- L5ANSWER 7 OF 10 LIFESCI COPYRIGHT 2008 CSA on STN DUPLICATE 1 Polynucleotide phosphorylase (PNPase) synthesis is translationally ABautocontrolled via an RNase III-dependent mechanism, which results in a tight correlation between protein level and messenger stability. In cells grown at 18 degree C, . . . or posttranscriptional, the expression of a set of pnp-lacZ transcriptional and translational fusions was analyzed in cells grown at different temperatures. In the absence of PNPase, there was no increase in pnp-lacZ expression, indicating that the increase in pnp expression occurs at a posttranscriptional level. Other experiments clearly show that increased pnp expression at low temperature is only observed under conditions in which the autocontrol mechanism of PNPase is functional. At low temperature, the destabilizing effect of PNPase on its own mRNA is less efficient, leading to a decrease in repression and an. . .
- L5ANSWER 8 OF 10 LIFESCI COPYRIGHT 2008 CSA on STN DUPLICATE 2 ABWhen Escherichia coli cells are shifted to low temperatures (e.g. 15 degree C), growth halts while the ' cold shock response' (CSR) genes are induced, after which growth resumes. One CSR gene, pnp, encodes polynucleotide phosphorylase (PNPase), a 3'-exoribonuclease and component of the RNA degradosome. At 37 degree C, ribonuclease III (RNase III, encoded by rnc) cleaves the pnp untranslated leader, whereupon PNPase represses its own translation by an unknown mechanism. Here, we show that PNPase cold-temperature induction involves several post-transcriptional events, all of which require the intact pnp mRNA leader. The bulk of induction results from reversal of autoregulation at a step subsequent to RNase III cleavage of the pnp leader. We also found that pnp translation occurs throughout cold

-temperature adaptation, whereas lacZ super(+) translation was delayed. This difference is striking, as both mRNAs are greatly stabilized upon the shift. . . pnp mRNA decay accelerates. Together with other evidence, these results suggest that mRNA is generally stabilized upon a shift to cold temperatures, but that a CSR mRNA-specific decay process is initiated during adaptation.

- L5 ANSWER 9 OF 10 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN DUPLICATE 3
- AB The effect of low temperatures on the distribution of RNase (EC 3.1.26.1) in the lichen Evernia prunastri (L.)
  Ach. has been studied in laboratory conditions. Freezing of lichen thalli produces solubilization of. . .
- L5 ANSWER 10 OF 10 BIOSIS COPYRIGHT (c) 2008 The Thomson Corporation on STN DUPLICATE 4
- AB. . . restored growth of suhB. These rnc mutations did not alter the level of suhB expression. These results suggest that wild-type RNase III exerts a lethal effect on E. coli upon depletion of SuhB at low temperatures. One explanation is to assume that the double-strand RNA-processing activity of RNase III itself is potentially lethal to E. coli. . .

#### => d his full

(FILE 'HOME' ENTERED AT 11:42:08 ON 10 JUL 2008)

INDEX 'ADISCTI, ADISINSIGHT, ADISNEWS, AGRICOLA, ANABSTR, ANTE, AQUALINE, AQUASCI, BIOENG, BIOSIS, BIOTECHABS, BIOTECHDS, BIOTECHNO, CABA, CAPLUS, CEABA-VTB, CIN, CONFSCI, CROPB, CROPU, DDFB, DDFU, DGENE, DISSABS, DRUGB, DRUGMONOG2, DRUGU, EMBAL, EMBASE, ...' ENTERED AT 11:42:28 ON 10 JUL 2008 SEA (RNASE? (2W) (III OR III OR 3))

1 FILE ADISINSIGHT

<sup>63</sup> FILE AGRICOLA

<sup>5</sup> FILE AQUASCI

<sup>48</sup> FILE BIOENG

<sup>3627</sup> FILE BIOSIS

<sup>55</sup> FILE BIOTECHABS

<sup>55</sup> FILE BIOTECHDS

<sup>295</sup> FILE BIOTECHNO

<sup>76</sup> FILE CABA

<sup>1477</sup> FILE CAPLUS

<sup>2</sup> FILE CEABA-VTB

<sup>1</sup> FILE CIN

<sup>16</sup> FILE CONFSCI

<sup>2</sup> FILE CROPU

<sup>7</sup> FILE DDFU

<sup>454</sup> FILE DGENE

<sup>72</sup> FILE DISSABS

<sup>23</sup> FILE DRUGU

<sup>9</sup> FILE EMBAL

<sup>543</sup> FILE EMBASE

<sup>394</sup> FILE ESBIOBASE

<sup>4</sup> FILE FSTA

<sup>977</sup> FILE GENBANK

<sup>124</sup> FILE IFIPAT

<sup>434</sup> FILE LIFESCI

<sup>736</sup> FILE MEDLINE

<sup>8</sup> FILE NTIS

<sup>1</sup> FILE OCEAN

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170
                   FILE PASCAL
                   FILE PHAR
               1
                   FILE PHARMAML
               1
                   FILE PHIN
               2
                   FILE PROMT
              10
             605
                   FILE SCISEARCH
             267
                   FILE TOXCENTER
            1207
                   FILE USGENE
            1693
                   FILE USPATFULL
               2
                   FILE USPATOLD
             138
                   FILE USPAT2
                   FILE WPIDS
              66
               1
                   FILE WPIFV
                   FILE WPINDEX
              66
                  FILE NLDB
L1
                QUE (RNASE? (2W) (III OR III OR 3))
                D RANK
     FILE 'BIOSIS, USPATFULL, CAPLUS, USGENE, MEDLINE, SCISEARCH, EMBASE,
     LIFESCI, ESBIOBASE, BIOTECHNO, TOXCENTER, PASCAL, USPAT2' ENTERED AT
     11:46:23 ON 10 JUL 2008
          11586 SEA (RNASE? (2W) (III OR III OR 3))
L2
           2380 SEA L2(S) (MICROB? OR PROKAR? OR BACTE? OR COLI? OR SHEWANE? OR
L3
                PSYCHRO? OR (COLD?(S) TEMPERATU?) OR (LOW?(S) TEMPERATU?))
                D KWIC L3 1
             25 SEA L3(S) (SHEWAN? OR (COLD(4W) TEMPERATU?) OR (LOW(4W)
L4
                TEMPERATU?) OR PSYCHRO?)
             10 DUP REM L4 (15 DUPLICATES REMOVED)
L5
                D TI L5 1-10
                D IBIB ABS L5 1-10
                D KWIC L5 1-10
     FILE HOME
     FILE STNINDEX
     FILE BIOSIS
     FILE COVERS 1926 TO DATE.
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CAS REGISTRY NUMBERS AND CHEMICAL NAMES (CNs) PRESENT FROM JANUARY 1926 TO DATE.

RECORDS LAST ADDED: 9 July 2008 (20080709/ED)

BIOSIS has been augmented with 1.8 million archival records from 1926 through 1968. These records have been re-indexed to match current BIOSIS indexing.

FILE USPATFULL

FILE COVERS 1971 TO PATENT PUBLICATION DATE: 10 Jul 2008 (20080710/PD)
FILE LAST UPDATED: 10 Jul 2008 (20080710/ED)
HIGHEST GRANTED PATENT NUMBER: US7398557
HIGHEST APPLICATION PUBLICATION NUMBER: US20080168588
CA INDEXING IS CURRENT THROUGH 10 Jul 2008 (20080710/UPCA)
ISSUE CLASS FIELDS (/INCL) CURRENT THROUGH: 10 Jul 2008 (20080710/PD)
REVISED CLASS FIELDS (/NCL) LAST RELOADED: Apr 2008
USPTO MANUAL OF CLASSIFICATIONS THESAURUS ISSUE DATE: Apr 2008

USPATFULL now includes complete International Patent Classification (IPC) reclassification data for the second quarter of 2008.